

REMARKS

Applicant has carefully reviewed the non-final Office Action of December 8, 2006 rejecting all claims, and respectfully traverses without amendment.

Claim 1 stands rejected as anticipated by, or in the alternative, obvious in view of, U.S. Patent No. 4,889,764 to Chenoweth et al. This claim reads on a conformable surfacing veil, and specifically requires a plurality of structural fibers and a plurality of bicomponent fibers coupled to the plurality of structural fibers. Each of the plurality of bicomponent fibers includes a core substantially surrounded by an outer polymer annulus. The melting point of the outer polymer annulus is significantly lower than the core and the plurality of structural fibers. This claim further requires that a portion of the plurality of structural fibers comprises one or more irregularly shaped fibers, and that the one or more irregularly shaped fibers have a melting point significantly higher than the outer polymer annulus.

As the Examiner implicitly acknowledges, Chenoweth et al. says nothing about the melting point of the synthetic fibers 14 relative to that of the sheath 20 of the bicomponent fibers 16. Thus, it cannot be the case that this reference expressly anticipates claim 1. Nevertheless, Chenoweth et al. allegedly discloses the exact same invention of claim 1 because it "teaches that during the curing of the product the sheath of bicomponent fiber melts and forms bonds between fibers 12 and 14." According to the Examiner, this "directly implies that the melting point of the second synthetic fibers is *significantly higher* than that of the sheath of the bicomponent fibers" (emphasis added).

Anticipation "by inherency" requires that the missing claim feature must necessarily be present in the reference. *Advanced Display Sys., Inc. v. Kent State Univ.*, 212 F.3d 1272, 1282, 54 USPQ2d 1673 (Fed. Cir. 2000) ("a prior art reference may anticipate without disclosing a feature of the claimed invention if that missing feature is *necessarily present*") (emphasis added). Consequently, the mere probability or possibility that the claimed invention might result under certain circumstances is insufficient. *Continental Can Company USA v. Monsanto Company*, 948 F.2d 1264, 1269, 20 USPQ2d 1746 (Fed. Cir. 1991) ("Inherency, however, may not be established by probabilities or possibilities. The mere fact that a certain thing may result from a given set of circumstances is not sufficient."). Moreover, as in all cases, the reference must be considered as a whole. See *W.L. Gore & Assocs., Inc. v. Garlock, Inc.*, 727 F.2d at 1550, 220 USPQ at 311 (Fed. Cir. 1983) ("The well established rule of law is that each prior art reference must be evaluated as an entirety").

In the instant situation, no substantial evidence or convincing line of reasoning explains why it is "necessarily" the case that the melting point of the synthetic fibers 14 is "substantially higher" than that of the sheath 20 of the bicomponent synthetic fibers 16 in Chenoweth et al. Simply observing that the sheath 20 might melt and bond with the fibers 12, 14 at some point during processing does not necessarily mean that the melting point of the fibers 14 is "substantially higher." Indeed, Chenoweth et al. expressly teaches that the sheath 20 and fibers 14 may both comprise Dacron® polyester (see col. 4, line 56 and col. 5, lines 33-36). This suggests that the melting points would be substantially similar, rather than substantially disparate as required by claim 1.

In attempting to provide further support for the rejection made in the previous Office Action, the Examiner contends that "[e]vidence that the fibers 14 do not melt while the sheath of the bicomponent fibers has melted is in Figures 3-4 . . ." of Chenoweth et al. However, claim 1 does not merely require that the irregular structural fibers "do not melt" while the sheath of the bicomponent fibers has melted. Rather, the claim requires that the melting point of the irregular fibers is "substantially higher" than that of the polymer annulus. Accordingly, Chenoweth does not qualify as the requisite substantial evidence that would anticipate or render obvious the invention of claim 1, so reconsideration and withdrawal of the rejection is respectfully requested.

The Examiner further explains that, in Chenoweth et al., "the materials disclosed for fibers 14 are aramids such as Kevlar® and Nomex®." According to the Examiner, such materials "do not have a defined melting point." Accordingly, "having irregularly shaped fibers having a melting point significantly higher than the outer polymer annulus would be recognized in the invention of CHENOWETH et al."

The difficulty with this position is twofold. First of all, the Examiner provides no evidence whatsoever to support the contention made that Kevlar® and Nomex® "do not have a defined melting point." If the Examiner possesses such evidence or a reference supporting this conclusion, it should be provided for consideration or else the rejection withdrawn. *In re Hoch*, 57 CCPA 1292, 428 F.2d 1341, 166 USPQ 406 (1970), ("[W]hen a reference is relied on to support a rejection, whether or not in a 'minor capacity,' there would appear to be no excuse for not positively including the reference in the statement of rejection.").

Secondly, if the Examiner is correct that Kevlar® and Nomex® "do not have a defined melting point," then these materials cannot qualify as the claimed irregular structural fibers of claim 1. This is because this claim expressly requires that the irregular fibers indeed have "a melting point." Similarly, independent claims 39 and 47 require structural fibers having a defined melting point. Accordingly, the inventions of these claims would not be "recognized in the invention of CHENOWETH et al.," since this reference teaches either structural fibers that have no defined melting point (according to the Examiner) or a melting point that matches that of an included bi-component fiber (e.g., when both comprise Dacron® polyester).

With regard to claim 8, it reads on a surfacing veil further comprising about 5 to 20 weight percent "microspheres." Despite the fact that this claim stands rejected based solely on Chenoweth et al., microspheres are simply not disclosed, taught, or suggested anywhere in this reference, let alone in the claimed range of about 5 to 20 weight percent. Accordingly, this reference cannot possibly anticipate or render obvious the invention of this claim. The same is true of claims 44-46, all of which expressly require microspheres, but stand rejected solely over Chenoweth et al.

The Examiner in making the rejection of these claims contends that the Chenoweth "teaches the inclusion of particles of a thermoplastic resin dispersed uniformly throughout the matrix . . . [a]nd also teaches the inclusion of particles or other finely divided or powdered conductive materials" The Examiner "equates these materials with the claimed microspheres," but without citing even a scintilla of evidence supporting their equivalency. Such a naked assertion cannot possibly qualify as the

requisite substantial evidence necessary to sustain a rejection of claims 8 and 44-46, all of which expressly require "microspheres" and not just the inclusion of "particles." Accordingly, withdrawal of these rejections and allowance of the claims is in order.

Claims 18 and 19 refer to a surfacing veil wherein the outer polymer annulus comprises a low melt copolymer polypropylene or polyethylene. The Examiner admits that these materials are not mentioned anywhere in Chenoweth et al., but cites to U.S. Patent No. 5,840,637 to Denton et al. as showing that "these materials are equivalent structures known in the art." First of all, Applicant respectfully submits that this is not the proper analysis, since there is absolutely no motivation or suggestion, either in the applied art or otherwise identified by the Examiner, to combine the teachings of these references to arrive at the claimed inventions. Secondly, simply because Denton et al. provides a listing of various types of bicomponent fibers does not mean that they are all "equivalents." Accordingly, a *prima facie* case of obviousness is lacking with respect to claims 18 and 19, as well as for claim 23 (which also requires that the outer polymer annulus recited in claim 1 comprise a low melt copolymer polypropylene).

Finally, new dependent claims 49-50 are presented for consideration. These claims require that the microspheres of claims 8 and 44, respectively, comprise "polymeric expandable microspheres." Support for this limitation is found in paragraph 32 of the specification. Since Chenoweth et al. discloses no polymeric expandable microspheres, it cannot possibly meet the terms of these claims.


In summary, none of the pending claims are anticipated or rendered obvious in view of Chenoweth et al., so the rejections should be

withdrawn and all claims formally allowed. Upon careful review and reconsideration, it is believed the Examiner will agree with this proposition. Accordingly, the early issuance of a formal Notice of Allowance is earnestly solicited to avoid the need for bringing this matter before the Board. Authorization is given to charge any fees required to Deposit Account No. 50-0568 in connection with this Amendment.

Respectfully submitted,

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